

**I CLAIM AS MY INVENTION:**

1. An injection vaporizer comprising:  
a reservoir for liquid to be vaporized;  
a delivery conduit having an outlet for injecting liquid to be vaporized  
into a gas space ;  
a pumping system operable to transfer liquid from the reservoir to the  
outlet;  
a heater for supplying thermal energy into the delivery conduit; and  
a pressure generator for generating an elevated delivery pressure  
within the delivery conduit and cooperating with the heater to  
establish a heated pressurized liquid at the outlet.
2. A vaporizer as claimed in claim 1 wherein the pressure  
generator comprises a pressure regulator in fluid communication with the  
outlet and responsive to pressure levels within the delivery conduit to inhibit  
egress of transferred liquid from the outlet until the elevated delivery pressure  
is generated.
3. A vaporizer as claimed in claim 1 wherein the pumping system  
also pressurizes the liquid to generate the elevated delivery pressure.
4. A vaporizer as claimed in claim 1 wherein the pumping system  
comprises a pair of pistons, each mounted for reciprocation within an  
associated pump chamber forming the reservoir and connected to a drive to

operate with pump strokes having a relative phase difference of substantially 180 degrees.

5. A vaporizer as claimed claim 1 wherein the heater supplies thermal energy in an amount to heat the liquid within the delivery conduit to a temperature of at least the boiling point of the liquid at a pressure externally of the outlet.